

Alcotex 552P is an aqueous solution of a 55% hydrolysed polyvinyl alcohol. It has been developed by Synthomer Ltd as a porosity enhancement agent for PVC suspension polymerisation. It has a low residual methanol content. Alcotex 552P can be used in conjunction with conventional primary suspending agents.

In optimised recipes, improvements can be obtained in the porosity/bulk density relationship. Better porosity facilitates both monomer removal and plasticiser uptake. These criteria are further enhanced when Alcotex 552P is used with the Alcotex range of primary suspending agents.

NMR measurements have shown that Alcotex 552P has a random distribution of acetate groups.

Property	Typical Value	Unit	Method <sup>1</sup>
Appearance:	Slightly Yellow aqueous solution		
Total Solids	39.5 - 40.5	%	ATP1
Degree of Hydrolysis	54.0 - 57.0	mole%	ATP16
Viscosity @ 23 °C Brookfield RVT 3/20	800 - 1400	mPa.s	ATP17
Cloud Point	> 45	°C	ATP18
Methanol Content	< 2	% w/w	ATP59

<sup>1</sup> internal method based upon the specified norm

## Application Advice

For detailed information, please contact the Alcotex Technical Service Team at [info@synthomer.com](mailto:info@synthomer.com)

Alcotex 552P can be charged either directly to the reactor or pumped into a flowing water charge line. It is desirable to add Alcotex 552P after at least some of the primary suspending agent has been added. It may be necessary to reduce the primary suspending agent level, to maintain grain size, as Alcotex 552P will tend to reduce it.

Alcotex 552P can be used over the whole molecular weight range, at high K values to increase plasticiser absorption and at low K values to improve VCM release.

Increased porosity obtained by using Alcotex 552P allows less severe stripping conditions to be used to achieve the required residual monomer levels. Thus it is often possible to reduce stripping time, steam consumption or stripping temperature with attendant advantages in increased output, reduced costs and improved product heat stability.

## Shipping and Storage

Alcotex 552P is stable under normal storage conditions, but do not store in temperatures at or above 45°C.

Alcotex 552P should be stored in sealed containers as received. In this condition, the product should remain fit for use for 24 months from the date of production. Beyond that date, the material may still be fit for use, but we would advise that it is good practice to test the material.

With normal standards of plant housekeeping there is no need to add bactericides. If circumstances dictate the use of bactericides then any of those which are compatible with PVC polymerisation or application may be used. If equipment becomes infected, dilute hypochlorite should be used for sterilisation. Alcotex 552P can be supplied in 220kg plastic drums, 1000kg cage type intermediate bulk containers or as full bulk deliveries.

## **Product Safety**

Before handling, please read the Safety Data Sheet of this product for advice on safety, use and disposal.